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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/046,710	01/17/2002	Yasumichi Kuwayama	Q68136	4857

7590 07/18/2002
SUGHRUE MION, PLLC
2100 Pennsylvania Avenue, NW
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EXAMINER

NGUYEN, CHAU N

ART UNIT PAPER NUMBER

2831

DATE MAILED: 07/18/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/046,710

Applicant(s)

KUWAYAMA ET AL.

Examiner

Chau N Nguyen

Art Unit

2831

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-9 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-9 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on ____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 2.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: .

DETAILED ACTION

Drawings

1. Figures 11A and 11B should be designated by a legend such as --Prior Art-- because only that which is old is illustrated. See MPEP § 608.02(g). A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

Claim Objections

2. Claims 4 and 8 are objected to because of the following informalities: in claim 4, line 3, delete "elastic", and in claim 8, line 3, delete "elastic". Appropriate correction is required.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the

subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary.

Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

5. Claims 1, 2, 5 and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Martin (3,143,595) in view of Wilcox (6,261,137).

Martin discloses a structure comprising a wire (not numbered) including a conductor portion and an insulating sheath, and a terminal (12) including a substantially cylindrical wire connection portion, wherein the conductor portion and the insulating sheath are inserted in the wire connection portion and are held in intimate contact with an inner peripheral surface of the wire connection portion. Martin does not specifically disclose the wire connection portion being pressed radially uniformly over an entire periphery thereof to hold the conductor portion and the insulating sheath in intimate contact.

Wilcox discloses a connecting structure wherein the wire connection portion of a terminal is pressed radially uniformly over an entire periphery to make

electrical contact with a conductor portion of a wire (col. 3, lines 34-39). It would have been obvious to one skilled in the art to press the wire connection portion of Marint's terminal radially uniformly over the entire periphery as taught by Wilcox to hold the conductor portion and the insulating sheath tightly within the connection portion.

Re claim 2, Martin discloses the wire connection portion including a smaller-diameter insertion hole (20) for the conductor portion and a larger-diameter insertion hole for the insulating sheath (col. 3, lines 14-15), the smaller-diameter and the larger-diameter insertion holes being disposed in coaxial relation to each other. Claims 5 and 6 are method counterparts of claims 1 and 2.

6. Claims 3, 4, 7 and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Martin in view of Wilcox as applied to claims 1 and 5 above, and further in view of Reimert (4,830,408).

Reimert discloses a connector assembly comprising a terminal (114, Fig. 8) having a peripheral groove (146) in a connection portion for receiving a seal member (148), wherein the seal member is compressed in the peripheral groove when a sleeve (140) is inserted into the connection portion of the terminal to provide a seal between the terminal and the sleeve. Reimert also discloses the

outer peripheral surface of the sleeve being held in intimate contact with the seal member (re claims 3 and 4).

It would have been obvious to one skilled in the art to provide the wire connection portion of Martin's terminal with a peripheral groove and a seal member as taught by Reimert so that when the insulating sheath is inserted in the wire connection portion, the outer peripheral surface of the sheath is held in intimate contact with the wire connection portion to provide a seal between the two members. Noted that the modified structure of Martin is waterproof structure since it comprises structure and material as claimed.

Claims 7 and 8 are method counterparts of claims 3 and 4.

7. Claim 9 is rejected under 35 U.S.C. 103(a) as being unpatentable over Martin in view of Wilcox as applied to claim 5 above, and further in view of Churchill (3,934,333).

Churchill discloses an invention wherein a rotary swaging machine is used to press and reduce a cross-section of a wire. It would have been obvious to one skilled in the art to use the rotary swaging machine as taught by Churchill to press the wire connection portion of Martin to reduce the cross-section of the wire connection portion with a smooth outer surface.

Cited Art

8. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Lively, Dinger, and Kaiser disclose wire connecting structures.

Communication

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Chau N Nguyen whose telephone number is 308-0693. The examiner can normally be reached on Mon-Fri.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dean Reichard can be reached on (703) 308 3682. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 308 3431 for regular communications and (703) 305 1341 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0956.

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A handwritten signature in black ink, appearing to read 'Chau N Nguyen', with a stylized, cursive script.

Chau N Nguyen
Primary Examiner
Art Unit 2831

CN
July 12, 2002